

# TruEquine™ Science Short: The Fermentation Effect

Consistent, precise, effective:

Harnessing the power of fermentation to give the gut exactly what horses need to thrive

Fermentation is a naturally occurring component of the equine digestive process. Through fermentation, fibrous materials such as hay and grass are broken down within the hindgut to create metabolites like amino acids, vitamins, and short chain fatty acids. Metabolites get absorbed by the bloodstream for energy and other functions (Figure I).

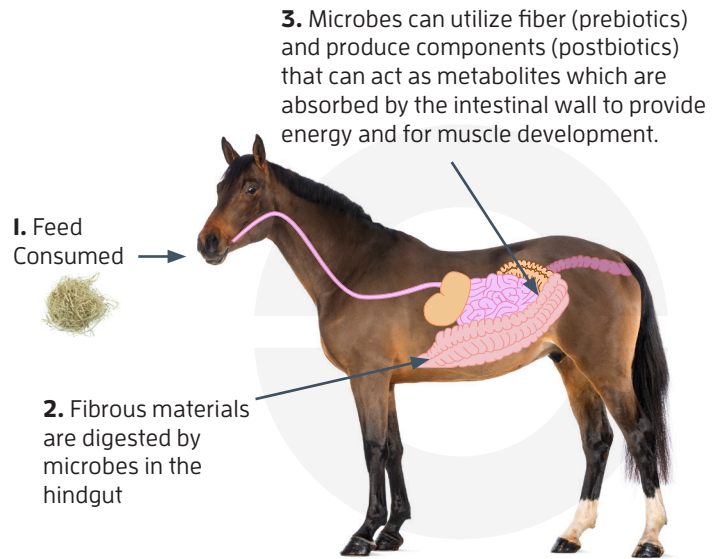


## Gut Check

How are postbiotics different from probiotics?

Postbiotics and probiotics both play important roles within the horse's gut. When probiotics (live microbes) enter the gut, they naturally ferment and produce postbiotics. Postbiotics are non-living and include metabolites which get absorbed by the intestinal wall for energy and to serve other life functions. Offering postbiotics directly through feeds and supplements is an efficient way to support consistent delivery of metabolites to the horse's gut.

Figure I: In vivo (in animal) hindgut fermentation



**Potential Challenge:**  
Metabolite Variability

In a non-stressed state, the gut typically ferments enough metabolites to maintain health. But almost all horses face daily stressors, and the gut is ground zero for stress. A stressed horse may not consistently ferment enough, or the right combination of metabolites needed for optimal gut function.

TruEquine is a postbiotic technology that undergoes a controlled fermentation process before its consumed by the horse (Figure 2). This unique process enables TruEquine to deliver a consistent and precise combination of metabolites to the horse's gut with each serving when included in feeds or supplements. The result? A well-fueled gut that helps horses manage stress like pros.

Figure 2: Unique TruEquine Two-Step Fermentation Process



This document is provided to you, at your request, for informational purposes only. These materials do not, and are not intended to, constitute veterinary, legal or regulatory advice. The information contained in this document is based on publicly available sources and/or unpublished data and is believed to be true and accurate, but Diamond V does not guarantee or make any warranty of accuracy or completeness. Legal and regulatory compliance for your business is your responsibility. The purchaser/user assumes all risks relating to the use of the information contained herein, and agrees that we are not liable to you or any third party relating to the use of such information. We recommend you consult animal health, regulatory and legal advisors familiar with all applicable laws, rules and regulations.

© 2023. Cargill, Incorporated. All rights reserved. | Manufactured in the USA with globally sourced materials | Approved 10/25/2023 | FL\_EQ105\_1023

**TruEquine™**